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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
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| 09/522,359 | 03/09/2000 | Wadood Hamad | A-6756 | 3106 |

1726 7590 03/09/2006

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| EXAMINER |
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FERGUSON, LAWRENCE D

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| ART UNIT | PAPER NUMBER |
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1774

DATE MAILED: 03/09/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/522,359

Applicant(s)

HAMAD ET AL.

Examiner

Lawrence D. Ferguson

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 December 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4,6,8 and 18-36 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4,6,8 and 18-36 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1. This action is in response to the amendment mailed December 12, 2005.
Claims 1, 3 and 18 were amended and claims 20-36 were added, rendering claims 1-4, 6, 8 and 18-36 pending in this case.

Claim Rejections – 35 USC § 102(b)

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-3, 6, 20-27, 29 and 31-36 are rejected under 35 U.S.C. 102(b) as being anticipated by Lawson (U.S. 4,161,422).

Lawson discloses an impregnated paper comprising thermosetting resin (column 1, lines 21-22) having a pattern of impregnated zones in the form of discontinuous areas of any desired geometrical shape or configuration, such as circles, stripes, or regular or irregular polygons (column 3, lines 39-62). Lawson further discloses the paper has a polyester or acrylic composition (column 2, lines 55-57).

Claim Rejections – 35 USC § 103(a)

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 4 and 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lawson (U.S. 4,161,422).

Lawson is relied upon for instant claim 1. Lawson does not explicitly disclose the base weight percent of the polymer material. Basis weight percent are properties which can be easily determined by one of ordinary skill in the art. With regard to the limitation of the weight percentage, absent a showing of unexpected results, it is obvious to modify the conditions of a composition because they are merely the result of routine experimentation. The experimental modification of prior art in order to optimize operation conditions (e.g. weight percent) fails to render claims patentable in the absence of unexpected results. The weight percentage is optimizable as it directly affects the durability and flexibility of the paper. It would have been obvious to one of ordinary skill in the art to make the paper with the limitations of the weight percentage since it has been held that discovering an optimum value of a result effective variable involves only routine skill in the art. *In re Boesch*, 617 USPQ 215 (CCPA 1980).

Claim Rejections – 35 USC § 103(a)

6. Claim 18 is rejected under 35 U.S.C. 103(a) as being unpatentable over Lawson (U.S. 4,161,422) in view of Eber et al (U.S. 4,488,932).

Lawson is relied upon for claim 1 as above. Lawson does not explicitly disclose styrene butadiene in the paper structure. Eber teaches paper made of pulp having a geometric component which comprises styrene butadiene (column 15, line 42 through column 16, line 10). Lawson and Eber are both directed to paper compositions. It would have been obvious to one of ordinary skill in the art to have employed the styrene butadiene, as taught in Eber, in the paper of Lawson to improve the tensile strength of the paper (column 15, lines 42-68).

Claim Rejections – 35 USC § 103(a)

7. Claims 19 and 30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lawson (U.S. 4,161,422) in view of Mitchell et al (U.S. 6,010,595).

Lawson is relied upon for claim 1 as above. Lawson does not explicitly disclose cellulose acetate butyrate in the paper structure. Mitchell teaches a paper or paperboard comprising cellulose pulp fiber, polyester (column 2, lines 44-67) and cellulose acetate butyrate (column 6, lines 16-20).

Lawson and Mitchell are both directed to paper compositions. It would have been obvious to one of ordinary skill in the art to have employed the cellulose acetate butyrate, as taught in Mitchell, in the paper of Lawson to improve the cohesiveness of the paper.

Response to Arguments

8. The objection of claim 18 is withdrawn due to Applicant amending the claim as requested.

The arguments in regards to rejection under 35 U.S.C. 102(b) as being anticipated by Caldwell (U.S. 5,209,965) are moot based upon grounds of new rejection.

Conclusion

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lawrence Ferguson whose telephone number is 571-272-1522. The examiner can normally be reached on Monday through Friday 9:00 AM – 5:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rena Dye, can be reached on 571-272-3186. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should

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you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).



L. Ferguson
Patent Examiner
AU 1774



RENA DYE
SUPERVISORY PATENT EXAMINER

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